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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/568,039	09/25/2006	Detlef Schulze-hagenest	N81789LPK	2948
	7590 09/02/200 DDAK COMPANY	EXAMINER		
PATENT LEGA		DOTE, JANIS L		
343 STATE STREET ROCHESTER, NY 14650-2201			ART UNIT	PAPER NUMBER
			1795	
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Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

	Application No.	Applicant(s)		
	10/568,039	SCHULZE-HAGENEST ET AL.		
Office Action Summary	Examiner	Art Unit		
	Janis L. Dote	1795		
The MAILING DATE of this communication app Period for Reply	ears on the cover sheet with the c	orrespondence address		
A SHORTENED STATUTORY PERIOD FOR REPLY WHICHEVER IS LONGER, FROM THE MAILING DA - Extensions of time may be available under the provisions of 37 CFR 1.13 after SIX (6) MONTHS from the mailing date of this communication. - If NO period for reply is specified above, the maximum statutory period w - Failure to reply within the set or extended period for reply will, by statute, Any reply received by the Office later than three months after the mailing earned patent term adjustment. See 37 CFR 1.704(b).	ATE OF THIS COMMUNICATION 36(a). In no event, however, may a reply be tim vill apply and will expire SIX (6) MONTHS from cause the application to become ABANDONEI	l. lely filed the mailing date of this communication. (35 U.S.C. § 133).		
Status				
Responsive to communication(s) filed on <u>25 Secondary</u> This action is FINAL . 2b)⊠ This Since this application is in condition for allowar closed in accordance with the practice under Expression in the Expression in the practice under Expression in the Expression in the Expression in the Expression in the Expression	action is non-final. nce except for formal matters, pro			
Disposition of Claims				
4) ☐ Claim(s) 1-12 is/are pending in the application. 4a) Of the above claim(s) is/are withdray 5) ☐ Claim(s) is/are allowed. 6) ☐ Claim(s) 1-12 is/are rejected. 7) ☐ Claim(s) is/are objected to. 8) ☐ Claim(s) are subject to restriction and/or Application Papers 9) ☐ The specification is objected to by the Examine 10) ☐ The drawing(s) filed on 13 February 2006 is/are Applicant may not request that any objection to the or	vn from consideration. r election requirement. r. e: a)⊠ accepted or b)⊡ objected	•		
Replacement drawing sheet(s) including the correcti				
11)⊠ The oath or declaration is objected to by the Ex	aminer. Note the attached Office	Action or form PTO-152.		
Priority under 35 U.S.C. § 119				
12) Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f). a) All b) Some * c) None of: 1. Certified copies of the priority documents have been received. 2. Certified copies of the priority documents have been received in Application No 3. Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)). * See the attached detailed Office action for a list of the certified copies not received.				
Attachment(s) 1) Notice of References Cited (PTO-892) 2) Notice of Draftsperson's Patent Drawing Review (PTO-948) 3) Information Disclosure Statement(s) (PTO/SB/08) Paper No(s)/Mail Date 04/07/06.	4) Interview Summary Paper No(s)/Mail Da 5) Notice of Informal P 6) Other:	te		

1. The oath or declaration is defective. A new oath or declaration in compliance with 37 CFR 1.67(a) identifying this application by application number and filing date is required. See MPEP §§ 602.01 and 602.02.

The oath or declaration is defective because:

(1) The specification to which the oath or declaration is directed has not been adequately identified. See MPEP § 602.

The inventors should be swearing to "the specification of which was filed as PCT international application

PCT/US2004/026191 on 12 August 2004," not to the specification filed on 13 February 2006 as United States Application 10/568,039.

(2) The benefit of priority claimed to PCT/US2004/026191 under 35 U.S.C. 119 is incorrect.

This application is the national stage of the PCT application PCT/US2004/026191 filed under 35 U.S.C. 371: it is therefore a continuation of the prosecution of the application PCT/US2004/026191. There is no basis in 35 U.S.C. 119 for a claim for priority based on the PCT application.

2. The examiner crossed-out the three Japanese patent documents listed on the form PTO-1449 filed in the Information Disclosure Statement on Apr. 7, 2006, because applicants did not

provide copies of said documents. Rather, applicants provided English-language abstracts describing the Japanese documents. The examiner has considered the abstracts and has properly listed the abstracts on the attached form PTO-892 under the heading "Non-patent documents."

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- 3. The references cited in the Search Report issued on Oct. 14, 2004, have been considered.
- 4. The specification is objected to as failing to provide proper antecedent basis for the claimed subject matter. See 37 CFR 1.75(d)(1) and MPEP § 608.01(o). Correction of the following is required:

In claim 5, the recitation "one <u>essentially</u> colorless ink" (emphasis added) lacks antecedent basis in the specification.

See page 4, line 8, of the specification, which states that the "ink can also be colorless." The recited "essentially colorless ink" is broader than the originally disclosed colorless ink because it includes inks that are colorless as well as inks that are "essentially colorless."

5. The following is a quotation of the second paragraph of 35 U.S.C. 112:

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

6. Claims 1-5 and 10-12 are rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

Claim 1 is indefinite in the phrase "[a] process,

preferably toner-based, for said creation of a printing

format (14) on a printing medium (8)" (emphasis added) because

it is not clear whether the claim requires that a toner be used

since claims 3 and 4, each of which depends from claim 1 require

applying an ink to the printing medium.

Claim 1 is further indefinite in the phrase "process . . . for <u>said</u> creation of a printing format (14) on a printing medium (8), characterized by the scent of said printing medium (8) and/or said printing format (14) is at least influenced" (emphasis added) for lack of unambiguous antecedent basis for the phrase "said creation of a printing format" in claim 1. Claim 1 does not previously recite forming a printing format. It is not clear to what step "said creation" refers.

Claim 1 is also indefinite because it does not recite any positive steps. The phrase "process . . . for said creation of

a printing format . . . on a printing medium" appears to merely recite what the process is to make. Claim 1 fails to recite any active positive steps for forming a printing format on a printing medium. The phrase "a process . . . characterized by the scent . . . is at least influenced" appears to merely recite the result of the process. Claim 1 also fails to recite any active positive steps that achieve said result.

Claim 10 is indefinite in the phrase "[a] printing machine for said creation of a printing format on a printing medium, in a printing process that is toner-based" (emphasis added) because it is not clear to what "said creation" refers. The claim is directed to a printing machine, not to a process. In addition, it is not clear whether the phrase "in a printing process that is toner-based" requires that the machine comprise some apparatus components that are used to form a toner image or is merely a statement that the machine is merely used in a toner printing process.

Claim 11 is indefinite in the phrase "one printing unit

. . . that is located in <u>said</u> area upstream of a fuser mechanism

. . ." (emphasis added) for lack of unambiguous antecedent

basis in claim 10 from which claim 11 depends. Claim 10 does

not require that the printing machine comprises a fuser

mechanism or an area upstream from a fuser mechanism. Claim 10

merely recites a "printing machine . . . characterized by at least one printing unit . . .". It is not clear to what part of the machine "said area" refers.

Claim 12 is indefinite in the phrase "one printing unit . . . that is located in <u>said</u> area downstream of a fuser mechanism . ." (emphasis added) for lack of unambiguous antecedent basis in claim 10 from which claim 11 depends.

Claim 10 does not require that the printing machine comprises a fuser mechanism or an area downstream from a fuser mechanism.

Claim 10 merely recites a "printing machine . . . characterized by at least one printing unit . .". It is not clear to what part of the machine "said area" refers.

7. Claims 6 and 7 are objected to because of the following informalities:

In claims 6 and 7, the term "said smell" in the phrase "for at least influencing <u>said</u> smell of said printing medium (8) and/or said printing format (14)" (emphasis added) lacks antecedent basis in claims 6 and 7. The claims do not previously require that the printing medium or the printing format to have any smell.

Appropriate correction is required.

8. In the interest of compact prosecution, the examiner has interpreted the language in claim 1 as referring to any printing process that forms a "print format on a printing medium" that involves changing the smell of the print format and/or the printing medium. The examiner has interpreted the language in claim 10 as referring to any printing machine that comprises a printing unit that applies either a toner or an ink, where each comprises an aromatic substance, to a printing medium.

Furthermore, in light of the disclosure in the instant specification, the examiner has interpreted the term "aromatic substance" recited in instant claims as any substance that smells, i.e., that has an aroma, smelling sweet or spicy, fragrant or pungent, etc. See the disclosure in the instant specification at page 5, lines 1-7, which states "[w]hile not intended to be all-inclusive, the following represents a list of possible aromatic substances that can added to a toner: Lemon oil, clove, geranium, lavender . . . cat food, dog food . . . or the like. There are, in fact, no limits with respect to the aromatic substance that may be used."

Rejections based on these interpretations are set forth infra.

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9. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless -

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

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- (e) the invention was described in (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent or (2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effects for purposes of this subsection of an application filed in the United States only if the international application designated the United States and was published under Article 21(2) of such treaty in the English language.
- 10. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:
 - (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.
- 11. This application currently names joint inventors. In considering patentability of the claims under 35 U.S.C. 103(a), the examiner presumes that the subject matter of the various claims was commonly owned at the time any inventions covered therein were made absent any evidence to the contrary. Applicant is advised of the obligation under 37 CFR 1.56 to point out the inventor and invention dates of each claim that was not commonly owned at the time a later invention was made in

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order for the examiner to consider the applicability of 35 U.S.C. 103(c) and potential 35 U.S.C. 102(e), (f), or (g) prior art under 35 U.S.C. 103(a).

12. Claims 1, 4, 5, 7, 9, and 10 are rejected under
35 U.S.C. 102(e) as being anticipated by US 6,640,715 B1
(Watson).

Watson discloses forming oil-scented inks by adding a liquid oil-based scent, such as Italian bergamot, cinnamon, Italian mandarin orange, etc., to a colored plastisol ink having the desired color. Col. 3, lines 26-39, and col. 3, line 65, to col. 4, line 7, and Fig. 1, block 12. Watson further discloses forming a clear scented ink by adding the liquid oil-based scent to a clear plastisol ink. Col. 4, lines 15-20, and Fig. 1, block 14. Both the oil-scented colored and clear plastisol inks meet the compositional limitations of the ink recited in instant claims 4 and 7 and instant claims 4, 5, and 7, respectively. The method of making said inks meets the process step recited in instant claim 9.

Watson further teaches a process for forming a design on an article, e.g., a wearing garment, comprising the steps of screen printing the oil-scented colored ink to form a design on the article, and screen printing the oil-scented clear ink over the oil-scented colored ink design to cover said colored design.

Col. 4, line 48, to col. 5, line 32, and Fig. 1, blocks 18-24. The colored and clear screen-printed designs meet the "printing form" recited in instant claim 1. The article, e.g., wearing garment, meets the "printing medium" recited in instant claim 1. The Watson printing process meets the process recited in instant claims 1, 4, and 5. Watson further teaches that the process is performed using a screen printing machine, which comprises a screen print carousel comprising print stations. One of the print stations comprises a mesh screen having a specific stencil design and a reservoir comprising the oil-scented colored ink. The last print station comprises a mesh screen having a specific stencil design and a reservoir comprising the oil-scented clear ink. Col. 4, line 45, to col. 5, line 32, and Fig. 1, blocks 18-24. The Watson printing machine meets the apparatus components recited in instant claim 10.

13. Claims 1-11 are rejected under 35 U.S.C. 102(b) as being anticipated by WO 00/79346 A1 (Levy) ("corrected version").

Levy discloses processes for forming an image on a substrate with an electrophotographic process to from a toner image on the substrate or by an ink-jetting process to form an ink image on the substrate. Page 5, lines 7-28. Levy teaches that both the toner and the ink comprise a fragrance agent.

Page 1, lines 1-12; page 6, lines 2-4; and page 7, lines 10-24. According to Levy, the toner may contain the fragrance agent in particulate form either in the toner itself or as a separate compatible particle. Page 6, lines 1-4. The fragrance agent may be impregnate into a colorant particle. Page 6, lines 21-24. In the inkjet inks, the fragrance agent may be in either the microparticle form or soluble in the carrier solvent.

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Page 7, lines 19-20. The Levy fragrance-containing colored toner and fragrance-containing colored ink meet the toner and ink compositional limitations recited in instant claims 2 and 6 and claims 4 and 7, respectively. The addition of the fragrance agent to the toner and to the ink meets the process limitation recited in instant claims 8 and 9, respectively.

Levy discloses a process for forming colored images 12 and 14 on an "imprintable substrate," such as paper, by forming the images with a colored toner comprising a fragrance agent and fusing the toner images to the substrate. See Fig. 1 and page 8, lines 9-13. Levy further discloses another process comprising the steps of forming colored images 112 and 114 on an imprintable substrate with a colored toner not comprising a fragrance agent and forming an image 116 on a portion on the substrate not comprising the colored images with a non-colored toner comprising a fragrance agent. Fig. 2 and page 8,

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lines 13-28. Levy further teaches that the non-colored toner area may overlap a portion or all of the printed colored toner images. Page 8, lines 22-25. As discussed above, Levy teaches the imaged substrates in Figs. 1 and 2 can be formed by an ink-jetting process using colored inks comprising a fragrance agent or using non-fragrant colored inks and non-colored inks comprising a fragrance agent. Page 1, lines 1-10 and page 5, lines 29-31. The Levy fragrance-containing non-colored toner and fragrance-containing non-colored ink meet the toner and ink compositional limitations recited in instant claims 2 and 3 and claims 4 and 5, respectively. The Levy printing processes meet the process limitations recited in instant claims 1-5.

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According to Levy, the fragrance-containing toner and fragrance containing ink can be used in currently available commercially printing technologies, such as xerographic copiers, digital copiers, inkjet copies, etc. Page 8, line 29, to page 9, line 8. Because, as discussed above, in Fig. 1, Levy forms a fragrant toner image fused on a substrate, Levy also teaches a printing machine comprises a toner printing unit as recited in instant claims 10 and 11.

14. Claims 1, 4, 7, 9, and 10 are rejected under 35 U.S.C. 102(b) as being anticipated by European Patent 1,002,840 A1 (Moreland).

Moreland discloses a scented inkjet ink comprising at least one fragrant oil. Paragraph 0016 and 0017, and example 1 in paragraph 0034. The scented inkjet ink is made by forming an inkjet ink and adding the fragrant oil. See example 1. The Moreland inkjet ink and method of making meet the product and process limitations recited in instant claims 4 and 7 and claim 9, respectively. Moreland further teaches incorporating the ink in an EPSON 400 ink jet printer. According to Moreland, the ink jet printer provided printed ink images on paper with a fragrant aroma. See example 1 and example 2 in paragraph 0036. The Moreland printing process meets the steps recited in instant claims 1 and 4. The EPSON 400 ink jet printer comprising the Moreland ink meets the apparatus limitations recited in instant claim 10.

15. Claims 1-3, 6, 8, and 10 are rejected under 35
U.S.C. 102(b) as being anticipated by Japanese Patent 06-295092
(JP'092). See the Japanese Patent Office (JPO) machine-assisted translation of JP'092 for cites.

JP'092 discloses a microencapsulated toner 100 composed of a perfume 101, a color material 102, and a wall material 103 comprising a resin. Translation, paragraphs 0009, 0010, and 0013, and Drawing 1. The JP'092 toner comprising the color material meets the toner limitations recited in instant claims 2 and 6 and the step of adding an aromatic substance recited in instant claim 8.

JP'092 further teaches a printing process that uses the printing apparatus shown in Drawing 2. The printing apparatus in drawing 2 comprises a printing unit comprising a container 11 comprising the JP'092 microencapsulated toner. According to JP'092, a toner image is formed on the charged back plate roller 22, the toner image is transferred to a base material 20, and the toner image on the base material 20 is fixed on the base material by the "anchorage device" 26. Translation, paragraphs 0029-0032. The JP'092 printing apparatus meets the apparatus limitations recited in instant claim 10. The JP'092 printing process meets the process limitations recited in instant claims 1 and 2.

JP'092 further teaches that when coloring is not necessary, the color material can be excluded from the microencapsulated toner. Paragraph 0036. Thus, when the JP'092 perfumed microencapsulated toner comprising no color material is used in

the JP'092 printing apparatus, the printing process forms a non-color toner image. That printing process meets the process limitations recited in instant claims 1 and 3.

16. Claims 1-5 and 10-12 are rejected under 35 U.S.C. 103(a) as being unpatentable over US 6,535,713 B2 (Richards) combined with Levy.

Richards discloses a printing apparatus for controlling gloss. Col. 4, lines 6-8. The apparatus comprises an electrophotographic toner printing unit 400 for forming a colored toner image on a substrate and a clear application unit 406 that applies a clear toner over the colored toner image. The clear application unit 406 may be an electrophotographic toner printing unit or an inkjet (piezoelectric or thermal) printing unit, and the clear toner may be a solid or a liquid. The printing unit 400 may comprise more than one color toner printing unit. Fig. 1b and col. 9, lines 1-24. According to Richards, the clear toner may be applied to an unfixed or fixed colored toner image. Col. 4, lines 9-13. Richards teaches that the clear application unit may be placed after the fuser or fixer that fixes the color toner image to the substrate. Col. 5, lines 51-53, and Fig. 3.

Fig. 3 shows a printing apparatus comprising the clear toner application unit 200 after the fuser.

Thus, when the clear application unit 406 is an inkjet unit, the Roberts printing apparatus meets the limitations of the apparatus recited in instant claims 10-12, but for the presence of a toner or ink comprising an aromatic substance. When the clear application unit 406 is an electrophotographic toner unit, the Roberts printing apparatus meets the limitations of the apparatus recited in instant claims 10 and 11, but for the presence of a toner or ink comprising an aromatic substance. Roberts printing apparatuses perform printing processes that meet the steps recited in instant claims 1-5, but for the use of a toner or ink comprising an aromatic substance.

Roberts does not limit the composition of the toners or the inks used in the printing apparatuses.

Levy teaches that a fragrance agent may be added to colored toners and non-colored toners and to colored and non-colored inkjet inks. Page 1, lines 1-10; page 5, lines 29-31; page 6, lines 2-4 and 21-24; page 7, lines 10-24; and page 8, lines 3-8. In inkjet inks, the fragrance agent may be present as microparticles or in soluble form in the carrier solvent.

Page 7, lines 19-24. According to Levy, the fragrant non-colored toner or inkjet ink provide a fragrant printed article.

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Page 4, lines 1-14; page 8, lines 3-8 and 16-18; and Fig. 2.

Levy further teaches that the fragrant non-colored toner or noncolor inkjet ink images may overlap a portion or all of the
printed colored toner images. Page 8, lines 22-25.

It would have been obvious for a person having ordinary skill in the art, in view of the teachings of Levy, to incorporate a fragrance agent in the clear solid toner or clear inkjet liquid toner, as taught by Levy, in the printing apparatuses disclosed by Roberts comprising either the clear electrophotographic toner application unit or the clear inkjet application unit. That person would have had a reasonable expectation of successfully obtaining printing apparatuses and practicing printing processes that provide fragrant glossy colored printed media.

17. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Janis L. Dote whose telephone number is (571) 272-1382. The examiner can normally be reached Monday through Friday.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Mr. Mark Huff, can be reached on (571) 272-1385. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Any inquiry regarding papers not received regarding this communication or earlier communications should be directed to Supervisory Application Examiner Ms. Sandra Sewell, whose telephone number is (571) 272-1047.

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Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

/Janis L. Dote/
Primary Examiner, Art Unit 1795

JLD Aug. 27, 2009